

WILDLIFE MANAGEMENT UNIT 16B - MANTI-NEBO, MANTI NORTH

Boundary Description

Utah, Sanpete, Emery, and Carbon counties - Boundary begins at Highway SR-10 and Highway SR-31 in Huntington; then north on SR-10 to Highway US-6; northwest on US-6 to Highway US-89; south on US-89 to SR-31; southeast on SR-31 to Huntington.

This unit was previously called the Northeast Manti Deer Herd Unit 30. In the spring of 1998, this unit was incorporated into the much larger Wildlife Management Unit #16. This subunit (16B) encompasses the east and west sides of the Wasatch Plateau. Most of the winter range in subunit 16B lies on the east side of the Wasatch Plateau, which rises straight up from the valley floor to ridges with heights over 9,500 feet. The winter range is a narrow strip of land along the base of the plateau below the 8,000 foot contour. It runs from Price Canyon south to Huntington Canyon. Other important winter ranges include a large section of land along the Price River in the Colton area, below Scofield Reservoir and in the mouths of several side canyons in Huntington Canyon. Elk winter ranges are found on south-facing grassy points at high elevations on the Wasatch Plateau. These include Ford Ridge, Hardscrabble, and large points on the south side of Gentry Mountain overlooking Huntington Canyon.

Currently, 54% of the winter range in Wildlife Management Unit 16 is managed by the BLM and U.S. Forest Service. The remaining portion is primarily owned by private entities, with a small amount of acreage being owned by the DWR. Summer range is 72% Forest Service lands, 22% privately owned, with the remainder made up of state owned lands.

The Manti-North area has historically supported a variety of wildlife and outdoor recreation, livestock grazing, ranches and farms, energy developments, and some forest industry. Industrial activities on the deer herd unit are associated primarily with coal production, electrical power generation, and oil and gas development. Exploration and development activities for oil and gas have the potential for future increases. Add to this a growing demand for low-sulfur Wasatch coal, and one can begin to visualize the demands placed upon winter ranges in this area.

Power plants, slack piles, coal load-out facilities, ghost towns, railroads, and agriculture compete for valuable winter range property. The Huntington Canyon Power Plant alone has removed over 400 acres of critical winter range. An extensive road system provides year-round access to large portions of the winter range. Heavily used access roads to coal mines dissect important winter ranges all along the east side of the Wasatch Plateau and are accountable for significant highway deer mortality.

Herd Unit Management Objectives

There are no current specific management objectives for subunit 16B, but only unit wide objectives. The current target winter herd size for all of unit 16 is to achieve a target population size of 60,600 (38,000 wintering deer on the Wasatch Plateau or Manti Mountain Portion of the unit and 22,600 on the Nebo portion). A post season buck to doe ration of 15:100 is sought with 30% of these bucks being 3 point or better.

Key Areas

Key wintering areas for deer include Wildcat Canyon and the Gordon Creek basin, Consumers Bench, Porphyry Bench, North Spring, several areas in Huntington Canyon, Gentry Mountain, and Spring Canyon drainages. Preferred elk wintering areas include Miles Point, Reynolds Point on Trail Mountain, Telephone Bench, and Diamanti Bench.

The winter range is made up of several habitat types which include pinyon-juniper, sagebrush/grass, mountain brush, grassland, seedings, and other miscellaneous vegetation types. Pinyon-juniper woodland is the most widespread type, accounting for 40 percent of the total winter range. Unfortunately, it is also among the least productive according to the 1980 range inventory. Sagebrush grass communities make up approximately 24 percent of the winter range and probably receive the heaviest use due to the availability of preferred forage.

Eight interagency range trend studies were established in June and July of 1988. Six sites sample the big sagebrush/grass range type. One study is on a higher elevation, steep slope, dominated by perennial grass, and another is in a pinyon-juniper chaining. Two studies that were established in 1989 in the Starvation drainage in Spanish Fork Canyon are now included in subunit 16B. These studies sample a curleaf mahogany area and an adjacent mountain brush site. Two additional studies were added in 1994. Both sites are on sagebrush-grass range, one on Consumer Bench, and the other on Wiregrass Bench. Six of the studies are on BLM land including Ford Ridge (#15), Hardscrabble (#16), North Springs Bench (#19), Poison Spring Bench (#22), Consumer Bench (#23) and Wiregrass Bench (#24). Five studies occur on State land including Starvation Mahogany (#8), Starvation Mountain Brush (#9), Slackpile (#17), Porphyry Bench (#18), and Telephone Bench (#20). One study, Huntington Canyon (#21), occurs on land administered by the U.S. Forest Service.

Grazing Summary

Most of the study sites in subunit 16B on which grazing occurs are on lands administered by the BLM. Ford Ridge is in the Price Canyon West allotment which is grazed by 92 cattle from May 17 to November 15. This sagebrush/grass ridge receives year-round elk use. Hardscrabble is in the Crandall Canyon allotment which is grazed from May 1 to October 31 by 31 cattle. It is an important site for elk in winter. North Spring Bench is in the allotment of the same name which is permitted for 1,000 sheep from May 1 to June 30. This study is on critical deer winter range. Poison Spring Bench is in the North Huntington cattle allotment is currently utilized by 354 cows in the spring (April 22 through June 26) and 282 cows in the winter (November 1 through December 15). The management plan outlines a two pasture deferred rotation system. The upper end of the allotment where the study is located was chained and seeded in the late 1960's. The Consumer Bench site is within the Consumer Wash allotment which is grazed by 54 sheep from October 1 to April 21, when an additional 821 sheep are allotted until June 20. Wiregrass Bench occurs in the Haley allotment which is grazed by 27 cattle from May 16 to October 31 in a two pasture deferred rotation.

The five trend studies on State land are not currently grazed by livestock. Slackpile is the only area where livestock grazing was permitted in the years immediately prior to study establishment. One hundred fifty AUM's (cattle) were allocated for use between May 15 and June 15, but grazing has since been discontinued. All areas receive heavy winter deer and elk use.

The remaining study, Huntington Canyon, is on U.S. Forest Service land. It occurs in the Gentry Mountain cattle allotment which is grazed by 1,440 cattle from June 27 through September 30. It is on a four pasture rest rotation schedule. This area contains important winter range for elk and portions of the southwest side of Gentry Mountain have been designated by the Forest Service in their Land and Resource Management Plan as "key big game winter range." This designation stipulates "the area must be available to big game and unencumbered each year during the critical winter period."

These key areas and the study sites for this herd unit were discussed and selected during an Interagency meeting in Price on March 8, 1988.

SUMMARY

WILDLIFE MANAGEMENT UNIT 16B - MANTI-NEBO, MANTI NORTH

The twelve range trend studies on the old NE Manti unit focus on two different types of key areas related to the big game species involved. Three studies were established to monitor key elk winter range; Ford Ridge (#15), Hardscrabble (#16) and Huntington Canyon (#21). The other studies are on ranges critical to deer, although many receive elk use. Most of the sites on the unit sample sagebrush-grass ranges. The Poison Spring Bench study (#22) is located in a pinyon-juniper chaining and Huntington Canyon samples a perennial grass range. Two studies established in 1994 at Consumer Bench (#23) and Wiregrass Bench (#24) were placed to monitor possible Wyoming big sagebrush die-off on important winter ranges for deer. The Starvation Mahogany (#8) and Starvation Mountain Brush (#9) sites were established on Division property in 1989 to monitor use by elk and mule deer, especially winter use.

The higher elevation site at Ford Ridge shows downward trends for soil and browse, with a slightly upward trend for the herbaceous component. This site will be dropped due to lack of use by elk, the primary reason the site was established. Two other high elevation sites at Hardscrabble and Huntington Canyon that were established to monitor elk use, currently show stable or upward trends in all categories. The chained pinyon-juniper site at Poison Spring Bench shows stable trends in soil, browse and herbaceous understory. The mountain big sagebrush/black sagebrush site at Telephone Bench has stable soil and herbaceous understory trends, with an improved browse trend. The other sagebrush-grass sites at Slackpile, Porphyry Bench, North Spring Bench, Consumer Bench, and Wiregrass Bench, all have improving or stable soil trends. Browse trends are stable at Porphyry Bench, North Spring Bench, and Consumer Bench, upward at Wiregrass Bench, and down at Slackpile. The herbaceous understory shows stable to upward trends on all of these sagebrush-grass winter range sites. The mahogany and mountain brush sites in the Starvation drainage show stable browse trends at the present time. Soil trend is stable at Starvation Mahogany, but down at Starvation Mountain Brush, with herbaceous trends stable or up at both sites.

This unit shows increasing deer use on the Wyoming big sagebrush sites at the lower elevations. Use in 1999 was moderate to heavy on these areas, ranging from 38 deer days use/acre at Wiregrass Bench to 159 deer days use/acre at North Spring Bench. With better precipitation patterns in recent years, the browse trends are stable to up at these sites. However, continued heavy wildlife use on these critical sagebrush ranges could result in the reversal of these improving trends, especially if associated with extended drought.

Site	Category	1989	1999
16B-8 Starvation Mahogany	soil	est	0
	browse	est	0
	herbaceous understory	est	0
16B-9 Starvation Mountain Brush	soil	est	-
	browse	est	0
	herbaceous understory	est	+
Site	Category	1994	1999
16B-15 Ford Ridge	soil	0	-
	browse	0	-
	herbaceous understory	-	+

Site	Category	1994	1999
16B-16 Hardscrabble	soil	-	+
	browse	0	+
	herbaceous understory	-	+
16B-17 Slackpile	soil	+	0
	browse	-	-
	herbaceous understory	0	0
16B-18 Porphyry Bench	soil	+	0
	browse	0	0
	herbaceous understory	+	0
16B-19 North Spring Bench	soil	+	+
	browse	-	0
	herbaceous understory	-	0
16B-20 Telephone Bench	soil	0	0
	browse	-	+
	herbaceous understory	0	0
16B-21 Huntington Canyon	soil	0	0
	browse	0	0
	herbaceous understory	0	0
16B-22 Poison Spring Bench	soil	-	0
	browse	0/-	0
	herbaceous understory	-	0
16B-23 Consumer Bench	soil	est	+
	browse	est	0
	herbaceous understory	est	+
16B-24 Wiregrass Bench	soil	est	0
	browse	est	+
	herbaceous understory	est	+

(0) = stable, (+) = upward, (-) = downward, (0/-) = stable to slightly downward, (0/+) = stable to slightly upward, (est) = trend study established